

RECORD OF PERFORMANCE QUALIFICATIONS
MK

INSTRUCTIONS

Record of Performance Qualifications shall be completed for enlisted personnel of the Coast Guard as outlined in the Enlisted Performance Qualifications Manual, COMDTINST M1414.8 (series). As proficiency in each performance qualification is demonstrated by actually performing the task listed, the DATE and INITIALS column shall be completed. Personnel are required to demonstrate proficiency in all new performance qualifications assigned to their rating. Performance qualifications previously demonstrated, dated and initialed off will not be recertified. Some performance qualifications include intent statements to help clarify the requirements of the task that is to be performed.

RATING

MACHINERY TECHNICIAN (Effective for the MAY 2003 Active Duty and the OCT 2003 Reserve SWE)

ABBREVIATION

MK

DATE COMPLETED ALL PERFORMANCE QUALIFICATIONS FOR RATE LEVEL

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NAME (Last, First, Middle Initial)

SOCIAL SECURITY NUMBER

SIGNATURE OF SUPERVISOR

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REMARKS

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| <p>A. ADMINISTRATION</p> <p>4.01 Retrieve the following information from CMPlus/MICA/FED LOG utilizing CG Standard Workstation IAW CMPlus user manual volume 2, Federal logistics data (FEDLOG) user's manual (CD-ROM) program.</p> <ul style="list-style-type: none"> a. Engineering Parts Inventory date. b. Engineering PMS data. c. Damage Control information. d. Technical Publications indices. e. Machinery History <p>Intent: The member will demonstrate the ability to navigate the database's, enter data, view and print data.</p> <p>4.02 Perform a Tag-Out as part of maintenance or repair procedure IAW Equipment Tag-Out Procedure, COMDTINST 9077.1 (series).</p> <p>Intent: The member will understand the requirements for equipment tag-out of engineering systems. The member should demonstrate the ability to secure all sources of power to the circuit, close all valves on a liquid, or pneumatic system, disabling all starting devices for rotating machines, and disabling/enabling mechanical lockout systems. The member should demonstrate how to tag-out acting as the person attaching the tag and as the person checking the tag. The member should demonstrate an equipment tag-in, acting as the person removing the tag and as the person checking the tag removal. The member should understand when the equipment or system could be placed back in operation.</p> <p>5.01 Develop engineering department Preventive Maintenance Schedules (PMS) IAW Naval Engineering Manual, COMDTINST 9000.6 (series), chapter 081, and CMPlus user manual volume 2.</p> <p>Intent: The member will develop/prepare amendments to PMS, develop PMS requirements for non-standard local equipment and make PMS entries in CM Plus database.</p> <p>6.01 Maintain unit engineering technical publications and drawings IAW Directives, Publications and Reports Index (DPRI), COMDTNOTE 5600 and Naval Engineering Manual, COMDTINST M9000.6 (series), chapter 086-1.</p> <p>Intent: The member will ensure unit has the appropriate publications by comparing equipment inventory to publications/drawing inventory. Member should be able to enter updates and changes when required.</p> | | |
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| <p>6.02 Maintain the following engineering department reports IAW Naval Engineering Manual, COMDTINST M9000.6 (series), chapters 041, 090.</p> <ul style="list-style-type: none"> a. Boat Inspection Report b. Cutter Engineering Report c. Drydock and Underwater Body Paint <p>Intent: The member will develop and prepare each report. Member will make entries; maintain appropriate file inventory and currency.</p> <p>6.03 Maintain the following engineering department files IAW Naval Engineering Manual, COMDTINST M9000.6 (series), chapters 041, 090.</p> <ul style="list-style-type: none"> a. ECR Files b. Engineering Work Request (Jet Forms, CMPlus) c. Machinery History Files d. CSMP e. SSMR f. Tag Out Log g. Boat Record <p>Intent: The member will make entries; maintain appropriate file inventory and currency.</p> <p>6.04 Prepare the following casualty report messages IAW Casualty Reporting (CASREP) Procedures (Material), COMDTINST M3501.3 (series), Operational Reports, NWP 1-03-1 (series), MLC Standard Operating Procedures (SOP), and CMPlus User Manual.</p> <ul style="list-style-type: none"> a. Initial b. Update c. Correction d. Cancellation <p>Intent: The member will report status, identify resource needs, assistance required, and repair parts. Member will assign the proper category classification and the time constraints involved.</p> | | |
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| <p>6.05 Compare Shore Side Maintenance Request (SSMR) with the associated Statement of Work IAW Naval Engineering Manual, COMDTINST M9000.6 (series) and Civil Engineering Manual, COMDTINST M11000.11 (series).</p> <p>Intent: The member will review Specifications for any technical shortcomings. Review will include matching SSMR to the statement of work and ensuring that the entire scope of the project is addressed. If changes are needed, member will submit change recommendations to the appropriate authority.</p> <p>7.01 Review specifications for an availability period and provide comments IAW MLCA SOP/MLCP instruction/MLC standard specifications, Naval Engineering Manual, COMDTINST M9000.6 (series), CSMP and ECR file.</p> <p>Intent: The member will review Specifications for any technical shortcomings. Review will include matching CSMP's to the statement of work and ensuring all interferences are identified within the specifications. If changes are needed, member will submit change recommendations to the appropriate authority. Member will validate specs by utilizing the CSMP/ECR file and MLC standard specifications.</p> <p>7.02 Develop diesel engine maintenance work list IAW Naval Engineering Manual, COMDTINST M9000.6 (series) and PMS schedule for hourly and conditional procedures.</p> <p>Intent: The member will develop an engine maintenance work list by inspecting the equipment and analyzing data from the applicable trend analysis listed below.</p> <ul style="list-style-type: none"> a. DEMP b. PAR c. ODR d. Engine Hours e. Oil Analysis/Hydraulic Analysis <p>7.03 Submit an engineering Department Budget/Financial Plan IAW unit procedures.</p> <p>Intent: The member will use historical budgetary data, pending unit projects, and current unit shortfalls to submit a budget via the chain of command.</p> | | |
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| <p>B. TRAINING</p> <p>6.01 Conduct a basic engineering casualty control exercise (BECCE) IAW Naval Engineering Manual, COMDTINST M9000.6 (series), chapter 079, NSTM chapter 079 volume 3., Boatcrew Qualification Guide, volume III, Engineer.</p> <p>Intent: The member will coordinate the drill event on either a CG Cutter or CG Standard Boat to include: imposing the drill, preparing the drill card, evaluating the drill, conducting both the pre & post briefing of the watch section.</p> <p>C. ELECTRICAL AND ELECTRONIC</p> <p>4.01 Install new wet cell starter/storage batteries as part of a maintenance or repair procedure IAW standard, NSTM, chapter 313 and Manufacturers Instructions.</p> <p>Intent: The member will demonstrate the ability to connect batteries in series and parallel. Member will understand what happens to amperage/voltage when batteries are connected in either parallel or series operation. Member will fill a wet cell battery with electrolyte and or distilled water. Member will place battery on a charge and understand the differences between initial, boost, normal and floating charge. Member will wear all required safety equipment.</p> <p>4.02 Maintain wet cell starter/storage IAW NSTM, chapter 313 and Manufacturer's Instructions.</p> <p>Intent: The member will as part of a maintenance or repair procedure check specific gravity and interpret readings as determined by the manufacturer's operating instructions for the hydrometer. Member will load test battery, place battery on charge. Member will wear all required safety equipment.</p> | | |
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| <p>4.03 Troubleshoot under supervision, common faults such as opens and grounds in one of the following alternating current electrical circuits IAW the Manufacturer's Technical Manuals and NSTM, chapter 491.</p> <ul style="list-style-type: none"> a. Motor b. Hot start <p>Intent: The member will demonstrate the proper usage of the following tools; multi meter, clamp on ammeter and megger. The member will conduct the following checks; current, voltage, resistance, insulation - resistance -to ground. Member will know and follow all safety precautions.</p> <p>4.04 Troubleshoot under supervision, common faults such as opens and grounds in one of the following DC electrical circuits using, a multi-meter IAW NSTM, chapters 491,330 and 400.</p> <ul style="list-style-type: none"> a. Starting circuit b. Charging circuit c. Lighting circuit d. Engine Alarm Circuit e. Steering <p>Intent: The member will understand basic electrical theory as it applies to direct current (DC) circuits. The member will have a basic understanding of electrical prints. The member will be capable of selecting and operating required test equipment on commonly found electrical components in a Coast Guard Standard or non Standard small boat. The member will conduct basic system checks and understand how to safely isolate electronics in order to prevent damage to those components. Member will troubleshoot for opens, faults and grounds.</p> <p>4.05 Renew electric wire and connectors as part of a maintenance or repair procedure on a Coast Guard standard or non standard boat IAW American wire gage (AWG) NSTM, chapter 320, manufacturer Tech Pubs.</p> <p>Intent: The member will know how to select the proper replacement wire and connectors for DC systems. Member will demonstrate selecting the proper wire then strip and install common compression connectors.</p> | | |
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| <p>5.01 Troubleshoot one of the following electronic circuits to the card level IAW NSTM, chapters 491,330 and 400.</p> <ul style="list-style-type: none"> a. Starting circuit b. Engine Alarm Circuit c. Steering <p>Intent: The member will understand safety and precautions associated with electronics. Member will become familiar with electronic block diagrams and identify components within the diagram for one of the above system found on a standard/non standard boat/cutter. Member will use a multi meter to isolate a fault to the card level. Member will remove/renew faulty card.</p> <p>6.01 Renew the following Alternating Current system components as part of a maintenance or repair procedure IAW NSTM, chapter 302 and Manufacturer Tech Pubs.</p> <ul style="list-style-type: none"> a. Motors 1 hp or less b. Switches <p>Intent: The member will renew AC components following all applicable safety precautions. The member will select the proper replacement components by comparing nameplate data. The member will then install the component using the proper connectors then place system back into operation.</p> <p>7.01 Troubleshoot one of the following electronic systems as part of a maintenance or repair procedure IAW NSTM, chapter 320 and 491.</p> <ul style="list-style-type: none"> a. Charging system b. Engine alarm system c. Bilge alarm system d. Starting systems e. Auxiliary system <p>Intent: The member will select test equipment to troubleshoot and take corrective actions to repair one of the above systems. Member to possess the ability to read block diagrams.</p> | | |
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| <p>D. VALVES</p> <p>4.01 Maintain the following valves found in common Coast Guard systems as part of a maintenance or repair procedure (e.g.; Firemain, Raw Water, Potable Water, Chill Water, Fuel Oil, Sewage and Hydraulic oil) IAW NSTM, chapter 505 and MLC Standard Specifications.</p> <ul style="list-style-type: none"> a. Check b. Pressure regulating/relief c. Ball d. Butterfly e. Gate f. Globe g. Needle h. Petcock i. Temperature controlled/regulating <p>Intent: The member will understand the functional characteristics of the above type valves. Member will perform basic maintenance associated with each type of valve to include lubrication, cycling, visual inspection, testing and understand how to perform lapping procedures. Member will identify safety procedures with removing/installing valves.</p> <p>E. TUBING, PIPING AND HOSES</p> <p>4.01 Assemble tubing/copper pipe as part of a maintenance or repair procedure using each of the following techniques IAW NSTM, chapter 505.</p> <ul style="list-style-type: none"> a. Silver Soldering/brazing b. Soft Soldering c. Flare fittings d. Compression fittings <p>Intent: The member will understand how to select the proper assembly technique. Member will safely operate the oxy/acetylene torch, cut, size, bend, flare tubing/pipe and solder tubing/pipe.</p> <p>4.02 Install flexible hose as part of a maintenance or repair procedure IAW Naval Engineering Manual, COMDTINST M9000.6.(series), chapter 505, NSTM, chapters 556/505 and Manufacturer's Tech Pubs.</p> <p>Intent: The member will select proper tools and replacement materials to include; flexible hose, reusable fittings, gaskets, and thread sealers prior to conducting the job. Member will understand how to size, assemble, install, and test flexible hose.</p> | | |
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| <p>4.03 Install flange shielding to a piping system using proper tools and materials IAW Naval Engineering Manual, COMDTINST M9000.6 (series) chapter 077, NSTM Chapter 635.</p> <p>Intent: The member will demonstrate proper installation techniques and demonstrate the proper usage of lockwire pliers.</p> <p>4.04 Install PVC and Steel piping as part of a maintenance or repair procedure IAW NSTM chapter 505 and Manufacturer's Tech Pubs.</p> <p>Intent: The member will demonstrate the proper usage of the following tools when performing this qualification: bench grinder, drill press, taps dies, thread files. Member will select replacement materials to include; steel, stainless steel, PVC piping, fittings, gaskets, glue, primer and thread sealers prior to conducting the job. Member will cut, size, and thread piping.</p> <p>F. AUXILIARY EQUIPMENT</p> <p>4.01 Operate an AC&R system IAW GoodHeart & Wilcox Modern Refrigeration Book, Manufacturer Tech Pubs, and EOP.</p> <p>Intent: The member will understand theory of operation, component function and be capable of system component identification. Given a secured AC&R system, member will properly place system on line and then secure.</p> <p>4.02 Troubleshoot and Repair the common casualties associated with centrifugal pumps as part of a maintenance or repair procedure IAW Manufacturer Tech Pubs, and NSTM, chapter 503</p> <p>Intent: The member will understand centrifugal pump theory. Member will systematically locate cause of casualty. Member will know all safety precautions associated with performing maintenance and repairs. Member will conduct repairs which, include; replacing seals, bearings and impellers.</p> | | |
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| <p>4.03 Maintain air compressors as part of a pneumatic system IAW NSTM, chapter 551, and Manufacturer Tech Pubs.</p> <p>Intent: The member will understand the basic safety and principles of operation of either a start air compressor; ships service air compressor or a fixed shop air compressor. Member will be adjust drive belt tension, clean cooling fins, replace air filters add and change oil.</p> <p>4.04 Maintain strainers and filters in the following systems IAW units PMS Procedures, Manufacturer Tech Pubs.</p> <ul style="list-style-type: none"> a. Fuel b. Oil c. Sea Water d. Air e. HVAC <p>Intent: The member will understand the functional characteristics of simplex and duplex strainers. Member must know associated safety precautions. Member will know how to clean or replace strainers filters.</p> <p>5.01 Maintain potable water tanks and system IAW Naval Engineering Manual, COMDTINST 9000.6 (series), Water Supply and Waterwaste Disposal Manual, COMDTINST M6240.5 (series) and NSTM, chapter 533.</p> <p>Intent: The member will conduct P/W testing and treatment (Bromine and Chlorine) procedures.</p> <p>5.02 Troubleshoot common casualties in a Pneumatic system as part of a maintenance or repair procedure IAW Manufacturer Tech Pubs and NSTM, chapter 551.</p> <p>Intent: The member will know major components of either a ships service, start air, or shop fixed air system. Member will systematically troubleshoot a non-functioning system to determine what component or components have failed, to include; pressure regulating, pressure relief valves, air water separators, and isolation valves. Member will renew defective components, and/or adjust components to restore the system to proper operation.</p> | | |
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| <p>6.01 Overhaul one of the following types of heat exchangers found in MDE's, SSDG's, AC&R, ASW, and MGT's IAW Manufacturer Tech Pubs, PMS schedule and NSTM, chapter 254.</p> <ul style="list-style-type: none"> a. Tube & Shell b. Fin & Tube c. Plate Type <p>Intent: The member will clean and overhaul a heat exchanger from one of the above systems.</p> <p>G. BOILER AND DISTILLERS</p> <p>5.01 Maintain a reverse osmosis system IAW NSTM, chapter 531, volume 3 and Manufacturer Tech Pubs.</p> <p>Intent: The member will understand the principals of operation. Member will be capable of changing oil in the high PSI pump, changing the filters, both membrane and sand.</p> <p>6.01 Maintain Auxiliary Boiler found on either a Coast Guard Cutter or shore facility IAW Naval Engineering Manual, COMDTINST M9000.6 (series), chapter 517, NSTM, chapter 220, volume 2, PMS schedule and Manufacturer Tech Pubs.</p> <p>Intent: The member will understand the principals of operation and be capable of performing adjustments and repairs to the following components;</p> <ul style="list-style-type: none"> a. Fuel nozzles b. Blower assemblies c. Flame detector ring d. Fuel pump e. Handhole Covers & Gaskets f. Electrodes g. Photoelectric eye h. Safety Devices i. Firing Controls | | |
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| <p>6.02 Maintain flash type evaporator IAW Water Supply and Waterwaste Disposal Manual, COMDTINST M6240.5 (series), Naval Engineering Manual, COMDTINST M9000.6 (series), NSTM, chapter 533. and Manufacturer Tech Pubs.</p> <p>Intent: The member will understand the principals of operation and will adjust steam, feed water, distillate and brine flows. Member will treat feedwater and clean unit as per PMS procedures.</p> <p>H. OILY WATER SEPARATORS</p> <p>5.01 Maintain an oily water separator IAW the Manufacturer Tech Pubs, PMS procedures and NSTM, chapter 593.</p> <p>Intent: The member will understand the principals of operation. Member will align system, adjust the OCA, monitor PPM, inspect or replace coalescing elements and maintain safety devices.</p> <p>6.01 Troubleshoot and Repair an oily water separator as part of a maintenance or repair procedure IAW Manufacturer's Tech Pubs NSTM, chapter 593.</p> <p>Intent: The member will systematically troubleshoot an inoperative OWS, identify faults such as loss of power, loss of pump suction, and system stuck in a constant re-circulation cycle. Member will take corrective actions to bring system up to full operation.</p> <p>I. LUBE OIL AND FUEL OIL SYSTEMS</p> <p>4.01 Compare and Test Lube Oil Viscosity using a viscosity gage and falling ball comparator IAW Naval Engineer Manual, COMDTINST M9000.6 (series), NSTM, chapter 262 and Manufacturer's Tech Pubs.</p> <p>Intent: The member will understand the safety precautions associated with drawing lube oil samples from running equipment. Member will understand the causes and effects of viscosity changes. Member will know what operating hour intervals to pull oil samples.</p> | | |
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| <p>4.02 Prepare Lube Oil Sample for Spectro analysis IAW Naval Engineering Manual, COMDTINST M9000.6 (series), chapter 262.</p> <p>Intent: The member will follow all safety precautions. Member will draw sample, label, package and mail lube oil samples to the testing facility.</p> <p>4.03 Conduct a fuel oil test prior to fueling a CG Standard Boat or Cutter IAW Naval Engineering Manual, COMDTINST M9000.6 (series), chapter 541, NSTM, chapter 541 and Unit's Engineering Standing Orders.</p> <p>Intent: The member will draw a fuel sample prior to refueling and check for water sediment and report finding to the Fueling Officer.</p> <p>7.01 Conduct a shipboard fueling operation IAW Naval Engineering Manual, COMDTINST M9000.6 (series), chapter 541, NSTM, chapter 541 and Unit's Engineering Standing Orders.</p> <p>Intent: Following all safety procedures the member will oversee set-up, treatment, receipt and transfer of fuel.</p> <p>J. BEARINGS AND SEALS</p> <p>4.01 Renew gaskets, seals, packing, and/or O-rings as part of either a maintenance or repair procedure IAW NSTM, chapter 078, Volume, 244.</p> <p>Intent: The member will select the proper materials, and fabricate gaskets. The member will demonstrate the proper usage of the following tools when performing this qualification: gasket cutter, packing puller, seal puller. The member will then install new gaskets/seals/packing/O-rings used in Coast Guard machinery.</p> <p>5.01 Troubleshoot and Renew bearings found in common Coast Guard systems (eg; diesel engines, pumps, air compressors) IAW NSTM, chapter 244, and Manufacturer Technical Publications.</p> <p>Intent: The member will understand the principals of operation for the following bearing types; ball, roller, precision inserts, thrust bearings, bushings, collars and needle bearings. Member will perform basic maintenance to include lubrication, cleaning and inspecting bearings. Member will know common causes of bearing failure how to replace failed bearings.</p> | | |
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| <p>K. MECHANICAL SKILLS</p> <p>4.01 Align a Pump Shaft as part of a maintenance or repair procedure IAW NSTM, chapter 503, Preventive Maintenance Schedule Manual (PMS), and Manufacturer Tech Pubs.</p> <p>Intent: The member will understand the importance of proper pump alignment. Member will understand the different techniques used to align common pump couplings. The member will demonstrate the proper usage of the following tools when performing this qualification: dial indicator, machinist rule and thickness gages.</p> <p>4.02 Replace gauges as part of a maintenance or repair procedure IAW Manufacturer Tech Pubs.</p> <p>Intent: The member will select the appropriate gauge and identify the operating characteristics of the following gauges:</p> <ul style="list-style-type: none"> a. Temperature b. Duplex c. Compound d. Manometer <p>L. HYDRAULICS</p> <p>4.01 Maintain a hydraulic system IAW NSTM, chapter 556, Naval Engineering Manual, COMDTINST M9000.6 (series), Manufacturer Tech Pubs and unit PMS procedures.</p> <p>Intent: The member will understand the functional characteristics of the following components; Reservoirs, pumps positive displacement (vane, piston & gear), Motors (vane, piston & gear, cylinders (single, double acting), control valves. Member will draw a hydraulic oil sample for spectro-analysis, package and mail. Member will change filters, clean strainers and inspect for leaks.</p> | | |
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| <p>6.01 Troubleshoot a hydraulic system IAW NSTM, chapter 556, Naval Engineering Manual, COMDTINST M9000.6 (series), Manufacturer Tech Pubs and unit PMS procedures.</p> <p>Intent: The member will understand hydraulic theory and positive displacement pump theory. Member will conduct systematic checks of the following components to locate malfunction; pumps, motors, reservoirs, cylinders, filters, strainers and control valves. Member will make recommendations for corrective action. Once corrective action taken, member is to conduct Operational test.</p> <p>M. OUTBOARD MOTORS</p> <p>4.01 Maintain an outboard engine IAW Preventive Maintenance Schedule manual (PMS), and Manufacturer's Tech/Service Manual.</p> <p>Intent: The member will understand the mechanical and electrical components of an outboard motor and conduct Preventative Maintenance. Member will change lower unit oil, tune up, change zincs, adjust synchronization of carburetors, and replace water pumps. Member to conduct common corrective maintenance associated with outboard motors such as prop replacement, ignition system and charging system component replacement.</p> <p>5.01 Troubleshoot an outboard motor as part of a maintenance or repair procedure IAW Applied Theory for Outboard Technicians and Manufacturer's tech/service manual.</p> <p>Intent: The member will conduct systematic checks of electrical and mechanical components. Member will make recommendations and/or take corrective action.</p> | | |
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| <p>N. INTERNAL COMBUSTION ENGINES</p> <p>4.01 Overhaul an internal combustion engine listed in Naval Engineering Manual, COMDTINST M9000. 6 (series), chapter 233, table 233-1 IAW the Manufacturer's Tech Pubs.</p> <p>Intent: The member will overhaul under supervision one of the engines listed in the Naval Engineering Manual, COMDTINST M9000.6 (series). The member will demonstrate the proper usage of the following tools when performing this qualification: inside outside micrometers, dial indicator, calipers, thickness gages, depth gages, bearing pullers, snap ring pliers, machinist rule, torque wrench, gasket cutter, hydraulic press, lock wire pliers, compression tester, and helicoil kit. Member to renew/replace components worn below manufacturer's tolerances. Emphasis will be placed on the engines external attachments. Member to make all required adjustments and place engine back in operation.</p> <p>5.01 Troubleshoot as part of a maintenance or repair procedure an internal combustion engine listed in Naval Engineering Manual, COMDTINST M9000. 6 (series), chapter 233, table 233-1 IAW Manufacturer's Tech Pubs and PMS procedures.</p> <p>Intent: The member will systematically troubleshoot a diesel engine using DEMPS, ODR, PAR, round sheets, and tech pubs then make recommendations for repairs.</p> <p>5.02 Adjust an internal combustion engine listed in Naval Engineering Manual, COMDTINST M9000. 6 (series), chapter 233, table 233-1 IAW Manufacturer's Tech Pubs and PMS procedures.</p> <p>Intent: The member will adjust, overspeed trips, governors, fuel racks, valves, injectors, and linkages to any engine listed in the Naval Engineering Manual, COMDTINST M9000.6 (series), table 233-1.</p> <p>6.01 Supervise the overhaul of an internal combustion engine listed in Naval Engineering Manual, COMDTINST M9000.6 (series), chapter 233 table 233-1.</p> <p>Intent: The member will supervise the overhaul of one of the engines listed above in the Naval Engineering Manual, COMDTINST M9000.6 (series). Member to ensure all safety procedures are followed. In addition all tools and parts are staged for overhaul.</p> | | |
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| <p>O. MECHANICAL POWER TRANSMISSION EQUIPMENT</p> <p>4.01 Maintain propulsion-shafting seals IAW NSTM, chapters 244, PMS Manual and Manufacturer's Technical Manual.</p> <p>Intent: The member will make inspections and adjustments to any of the common shaft packing glands, seals found on CG Cutters and Small Boats. In addition, using a packing puller tool, remove worn packing. The member will then select the proper replacement packing/seals and install.</p> <p>5.01 Maintain propulsion transmission equipment IAW Manufacturer's Technical. Manual, NSTM, chapter 241 and units PMS schedule.</p> <p>Intent: The member will understand functional characteristics of commonly found reduction gears in the Coast Guard. Member to ensure quality and quantity of lube oil. Member to clean/change filters/strainers.</p> <p>5.02 Conduct a Rudder inspection as part of a maintenance or repair procedure IAW Manufacturer's Tech Pub, NSTM, chapter 562 and units PMS Schedule.</p> <p>Intent: The member will take rudder bearing clearance readings on a Coast Guard Standard Boat. Member will make recommendations concerning the condition found, then enter readings in the boat records.</p> <p>6.01 Align a propulsion shaft found on a Cutter or Standard Small Boat as part of a maintenance or repair procedure IAW NSTM, chapter 243 and Manufacturer's Tech Pub.</p> <p>Intent: The member will understand how the raising and lowering of foundation mounts changes the alignment relationship to the shaft. Member will align a propulsion shaft to an output coupling.</p> <p>6.02 Troubleshoot and Repair as part of a maintenance or repair procedure a propulsion transmission found on either a Cutter or Standard Small Boat IAW Manufacturer's Tech Pub, NSTM, chapter 241 and units PMS schedule.</p> <p>Intent: The member will have knowledge of shafting, gears, clutches, seals, and bearings. Member will make repairs/adjustments to any of the following components, selector valves, control linkages, seals, coolers, thermostats, clutch's, recommend corrective action for common casualties.</p> | | |
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| RATING: MACHINERY TECHNICIAN | INIT | DATE |
| <p>TERMINOLOGY</p> <p>ADJUST To bring parts or equipment into a truer or more effective setting or relationship.</p> <p>ALIGN place parts in proper position to one another.</p> <p>ASSEMBLEE To fit parts of a machine together.</p> <p>COMPARE To examine the character or qualities of, in order to discover resemblances of differences.</p> <p>CONDUCT To direct or control, lead, or guide.</p> <p>DEVELOP To set forth or make in detail.</p> <p>INSTALL To place a new or modified part in a system or equipment in accordance with established procedures, standards, specifications, drawings, directives and policies.</p> <p>LAP To cut or polish mating surfaces.</p> <p>MAINTAIN To preserve or keep in good repair.</p> <p>OPERATE To cause to function.</p> <p>OVERHAUL To disassemble, inspect, renew defective components, reassemble and place back in service.</p> <p>PERFORM To carry out an action or pattern of behavior.</p> <p>PREPARE Plan, gather, and assemble information to produce a document (i.e. forms and schedules).</p> <p>RENEW To remove a defective component and install a new component with the same specifications in its place.</p> <p>REPAIR To restore a circuit or machinery to an as intended operational state.</p> <p>REPLACE To remove and reinstall same component.</p> <p>REVIEW - To examine a document or process for accuracy in content and/or format and report errors or updates to the author or controlling authority.</p> <p>RETRIEVE To obtain data.</p> <p>SUBMIT - To prepare a report or form following a defined process and forwarding it to the prescribed authority.</p> <p>SUPERVISE To oversee, to critically watch, motivate and direct activities.</p> <p>TROUBLESHOOT The process of locating and diagnosing faults in equipment by means of systemic checking or analysis.</p> <p>VERIFY To determine the accuracy of recorded information by comparing to physical evidence.</p> | | |
| NAME (Last, First, Middle Initial) | SOCIAL SECURITY NO. | |